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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/015,778	12/17/2001	Douglas D. Sjostrom	02-35-0385 / 00167-456001	4406

7590  
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02/21/2007

EXAMINER

NGUYEN, VI X

ART UNIT	PAPER NUMBER
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3734

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	02/21/2007	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

# Office Action Summary

Application No.

10/015,778

Applicant(s)

SJOSTROM, DOUGLAS D.

Examiner

Victor X. Nguyen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 29 November 2006.
- 2a) ☒ This action is FINAL. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 18-81 is/are pending in the application.
- 4a) Of the above claim(s) 18-24, 60-63, 66-69 and 78-81 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 25-59, 64-65, 70-77 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

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## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 25-43,45-59 and 64-65 are rejected under 35 U.S.C. 102(b) as being anticipated by Porter (U.S. 1,360,016).

Porter discloses in figs. 2,4-5, a cutting instrument having the limitations of the above listed claims, including: a cutting instrument comprises an outer member (4) has an opening bounded by a sharp cutting edge (3), where a helical knife (2) coupled to the outer member for rotation relative to the outer member. The helical knife (2) would inherently has an edge to slide into tough, fibrous tissue to draw the tissue proximally along the helical knife towards the sharp cutting edge. As best seen in figure 2, the helical knife edge is arranged relative to the cutting edge such that the edges align in a plane perpendicular to a longitudinal axis of the instrument which is able to create a shearing action therebetween. Further, it is noted that fig. 4 of Porter can be clearly defined an inner member 5 including a shaft having a helical knife (2) with a v-

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shaped (v-shaped is considered from the curve segment between element 2 and element 3) that defined a sharp, slicing edge which is perpendicular to a longitudinal extent of the slicing edge.

Regarding claims 26-27, wherein the edge of helical knife (2) extends distally through the opening at 7; and where the cutting edge and the edge of helical knife configure to cut tissue.

Regarding claims 33-34 and 50-51, where the device further includes a hub (6), and the cutting edge is located at a distal end of the outer member. The outer member tapers to the cutting edge (fig.2). Furthermore, at best seen in figure 6, the pitch of the helical channel increases from distal end to the proximal end.

Claims 25-41,59,64 and 70-77 are rejected under 35 U.S.C. 102(e) as being anticipated by Veca et al (U.S. 6,053,923).

Veca discloses in figs. 2, 7, a cutting instrument having the limitations of the above listed claims, including: a cutting instrument comprises an outer member (68) has an opening bounded by a sharp cutting edge (98), where a helical knife (74) coupled to the outer member for rotation relative to the outer member. The helical knife would inherently has an edge to slide into tough, fibrous tissue to draw the tissue proximally along the helical knife towards the sharp cutting edge. As best seen in figures 8,10, the helical knife edge is arranged relative to the cutting edge such that the edges align in a plane perpendicular to a longitudinal axis of the instrument which is able to create a shearing action therebetween. Furthermore, the cutting instrument has an inner member 66 which defines an aspiration opening at 96 therein, the aspiration opening locates at a proximal portion of the helical knife. Regarding claims 70-77, Veca discloses the tough, fibrous

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tissue can comprise cartilage, fibroid tissue or meniscal cartilage as claimed in, col.1, lines 32-38.

***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 44 is rejected under 35 U.S.C. 103(a) as being unpatentable over Porter (U.S. 1,360,016).

Porter discloses the invention substantially as claimed. Although, Porter is silent regarding the inner member and the outer member is in the range of about 0.0005 to 0.002 inches. It would have been obvious matter of design choice to modify the inner member and the outer member is in the range of about 0.0005 to 0.002 inches, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art. In re-Aller, 105 USPQ 233.

***Response to Amendment***

3. Applicant's arguments filed 11/29/2006 have been considered but are moot in view of new ground(s) of rejections. Applicant is asked to please refer to the modified prior art rejections above where examiner addresses applicant's concerns regarding prior art rejection.

***Conclusion***

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4. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a).

Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

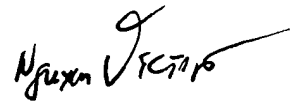
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Victor X. Nguyen whose telephone number is (571) 272-4699. The examiner can normally be reached on M-F (8-4.30 P.M).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Hayes can be reached on (571) 272-4697. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Victor X Nguyen  
Examiner  
Art Unit 3734



VN  
2/15/2007

M J Hayes  
MICHAEL J. HAYES  
SUPERVISORY PATENT EXAMINER

